

Claims

What is claimed is:

5

1. A system for implementing behavioral operations,
comprising:

a search engine connected to an input data;

10

an associative match memory connected to the search engine;

and

a behavioral operation unit connected to the associative match
memory.

15

2. The system of claim 1, further including a field descriptor
array connected to the associative memory.

20

3. The system of claim 1, wherein the associative match
memory includes an association and a behavioral indicator in an
entry.

4. The system of claim 1, wherein the associative match
memory includes a field descriptor in an entry.

25

5. The system of claim 3, wherein the behavioral indicator
is an association set.

6. The system of claim 3, wherein the behavioral indicator is a qualifier set.

5 7. The system of claim 3, wherein the behavioral indicator is a test set.

8. The system of claim 7, wherein the test set includes a score field.

10 9. The system of claim 3, wherein the behavioral indicator is a stack set.

15 10. The system of claim 3, wherein the behavioral indicator is an exclusion set.

 11. The system of claim 3, wherein the behavioral indicator is a continuation set.

20 12. The system of claim 2, wherein the field descriptor array includes a byte offset.

 13. The system of claim 2, wherein the field descriptor array includes a mask.

0997266-101304
T03707-9927660

14. A method of behavioral operation of a data document, comprising the steps of:

- a) scanning an input data to find a match;
- 5 b) when a match is found determining a behavioral set associated with the match; and
- c) when the behavioral set is an association set, using an association in the match to acquire a desired information.

10 15. The method of claim 14, further including the steps of:

- d) when the behavioral set is a qualifier set, determining a field descriptor pointer;
- e) looking up a field descriptor pointed to by the field
- 15 descriptor pointer;
- f) determining a field to be examined.

16. The method of claim 15, further including the steps of:

- 20 g) determining a mask associated with the field descriptor;
- h) applying the mask to the field to form a masked field.

0997266-10401